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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/666,024	09/18/2003	Reid Hayhow	10030557-1	7952
7590 01/24/2006 AGILENT TECHNOLOGIES, INC. Legal Department, DL429 Intellectual Property Administration P.O. Box 7599 Loveland, CO 80537-0599			EXAMINER CHUNG, PHUNG M	
			ART UNIT 2138	PAPER NUMBER

DATE MAILED: 01/24/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 10/666,024	Applicant(s) HAYHOW, REID	
	Examiner Phung My Chung	Art Unit 2138	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-15 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____. |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date ____. | 6) <input type="checkbox"/> Other: ____. |

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Double Patenting

1. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

2. Claims 1-6 and 10-13 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1, 3-7, 13 and 17 of copending Application No. 10/681,068. Although the conflicting claims are not identical, they are not patentably distinct from each other because all of the limitations of the rejected claims are claimed in at least one of the claims 1, 3-7, 13 and 17 of applicant's copending application, and

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there is no reason why the rejected claims could no have been presented in the copending application 10/681,068.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

The following table shows the claims in 10/666,024 that are rejected by corresponding claims in 10/681,068.

Claims Comparison Table

	10/666,024	10/681,068
Claims	1 and 10	1 and 13
	2 and 11	3
	3 and 12	4
	4 and 13	5
	5	6 and 17
	6	7

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

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(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 1-4 and 10-13 are rejected under 35 U.S.C. 102(b) as being anticipated by Fulks (4,727,312).

As per claim 1, Fulks disclose a method comprising: reading a test file including a plurality of test vectors to be applied to a device (col. 3, lines 31-33); and

determining a required memory needed to execute the plurality of test vectors (col. 1, lines 16-19; the required memory needed to execute the plurality of test vectors is declared to be large. Thus, the required memory was determined and used to execute the test vectors. Said test vectors are stored in a test program, or test file).

As per claim 2, Fulks further discloses wherein determining a required memory comprises determining a required memory needed for each of a plurality of boards of a tester to execute the test vectors for the board. (See col. 1, lines 10-11; the use of circuits in the plural form implies a plurality of board. The required memory would be determined for each one).

As per claim 3, Fulks further discloses wherein determining a required memory comprises determining a required memory needed for each of a plurality of pins of a tester to execute the test vectors for the pin. (See col. 1, lines 10-13; circuit terminals (pins) are tested. The plural form of terminal implies a plurality of pins for which the required memory is determined).

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As per claim 4, Fulks further discloses wherein determining a required memory comprises counting the number of test vectors for each of one or more tests in the test file (col. 1, lines 16-19; the number of test vectors is counted to be large).

As per claim 10, this claim is rejected under similar rationale as set forth in claim 1.

As per claim 11, this claim is rejected under similar rationale as set forth in claim 2.

As per claim 12, this claim is rejected under similar rationale as set forth in claim 3.

As per claim 13, this claim is rejected under similar rationale as set forth in claim 4.

Claim Rejections - 35 USC § 103

5. Claims 5-~~9~~¹⁴ and ~~14~~¹⁵ are rejected under 35 U.S.C. 103(a) as being unpatentable over Fulks (4,727,312) in view of Hughes (4,493,079).

As per claims 5 and 6, Fulks has been discussed above. Fulks does not disclose: determining a first memory requirement needed for a first pin of a tester to execute the test vectors for a first test in the test file; setting the required memory equal to the first memory requirement; and for each additional pin of the tester, determining a second memory requirement needed for the additional pin to execute the test vectors for the first test; and if the second memory requirement is greater than the first memory requirement, setting the required memory equal to the second memory requirement; and for each additional test in the test file: for each pin

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of the tester, determining a third memory requirement for the pin to execute the test vectors for the additional test; and setting the required memory equal to the third memory requirement if the third memory requirement is greater than the required memory. Hughes show this feature to be old in the test vector art. Hughes discloses using test vectors for four pins and loading the test vectors into the individual pin memory. (See col. 5, lines 16-28). This would require determining the memory requirement for each pin and for each of the test vectors to know the size the test vector store. Therefore, it would have been obvious to a person of ordinary skill in the art, at the time the invention was made, to incorporate the test vectors for four pins and loading the test vectors into individual pin memory as taught by Hughes into the invention of Fulks to determine the memory requirement for each pin to execute the test vectors.


As per claims 7-9^{and 14-15} the teaching of Fulks and Hughes have been discussed above. They do not specifically disclose that if the required memory exceeds an existing memory allotment, increasing the allotment of memory or notifying a user of an amount of additional memory required. However, it would have been obvious to a person of ordinary skill in the art, at the time the invention was made, to increase the memory allotment or notifying user of an amount of additional memory required. This is because Fulks discloses that a data-engine controller 34 can be arranged to perform other types of task too. Therefore, it would have been obvious to a person of ordinary skill in the art, at the time the invention was made, to increase the memory allotment or notifying the user of an amount of additional memory required using the data-engine controller of Fulks to satisfy the required memory needed to execute the plurality of test vectors.

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6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Phung My Chung whose telephone number is 571-272-3818. The examiner can normally be reached on Monday-Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Albert Decady can be reached on 571- 272-3819. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Phung My Chung
Primary Patent Examiner